



1646

## RAW SEQUENCE LISTING

DATE: 04/08/2002

PATENT APPLICATION: US/09/714,792

TIME: 09:15:57

Input Set : N:\jumbos\09714792.raw.txt

Output Set: N:\CRF3\04082002\I714792.raw

## SEQUENCE LISTING

Does Not Comply  
Corrected Diskette Needed*do edit*

4 (1) GENERAL INFORMATION:

6 (i) APPLICANT: Collins, Mary

7 Donaldson, Debra

8 Fitz, Lori

9 Neben, Tamlyn

10 Whitters, Matthew

11 Wood, Clive

13 (ii) TITLE OF INVENTION: CYTOKINE RECEPTOR CHAIN

15 (iii) NUMBER OF SEQUENCES: 9

17 (iv) CORRESPONDENCE ADDRESS:

18 (A) ADDRESSEE: Genetics Institute, Inc.

19 (B) STREET: 87 CambridgePark Drive

20 (C) CITY: Cambridge

21 (D) STATE: MA

22 (E) COUNTRY: USA

23 (F) ZIP: 02140

25 (v) COMPUTER READABLE FORM:

26 (A) MEDIUM TYPE: Floppy disk

27 (B) COMPUTER: IBM PC compatible

28 (C) OPERATING SYSTEM: PC-DOS/MS-DOS

29 (D) SOFTWARE: PatentIn Release #1.0, Version #1.25

31 (vi) CURRENT APPLICATION DATA:

C--> 32 (A) APPLICATION NUMBER: US/09/714,792

C--> 33 (B) FILING DATE: 16-Nov-2000

34 (C) CLASSIFICATION:

36 (viii) ATTORNEY/AGENT INFORMATION:

37 (A) NAME: Brown, Scott A.

38 (B) REGISTRATION NUMBER: 32,724

39 (C) REFERENCE/DOCKET NUMBER: GI5268

41 (ix) TELECOMMUNICATION INFORMATION:

42 (A) TELEPHONE: (617) 498-8224

43 (B) TELEFAX: (617) 876-5851

## ERRORED SEQUENCES

46 (2) INFORMATION FOR SEQ ID NO: 1:

48 (i) SEQUENCE CHARACTERISTICS:

49 (A) LENGTH: 1525 base pairs

50 (B) TYPE: nucleic acid

51 (C) STRANDEDNESS: double

52 (D) TOPOLOGY: linear

## RAW SEQUENCE LISTING

DATE: 04/08/2002

PATENT APPLICATION: US/09/714,792

TIME: 09:15:57

Input Set : N:\jumbos\09714792.raw.txt

Output Set: N:\CRF3\04082002\I714792.raw

```

54      (ii) MOLECULE TYPE: cDNA
56      (iii) HYPOTHETICAL: NO
59      (ix) FEATURE:
60          (A) NAME/KEY: CDS
61          (B) LOCATION: 256..1404
64      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 1:
E--> 66  GAATTCGGCA CGAGGGAGAG GAGGAGGGAA AGATAGAAAG AGAGAGAGAA
67  AGATTGCTTG      60
E--> 69  CTACCCCTGA ACAGTGACCT CTCTCAAGAC AGTGCTTTGC TCTTCACGTA
70  TAAGGAAGGA      120
E--> 72  AAACAGTAGA GATTCAATTT AGTGTCTAAT GTGGAAAGGA GGACAAAGAG
73  GTCTTGTGAT      180
E--> 75  AACTGCCTGT GATAATACAT TTCTTGAGAA ACCATATTAT TGAGTAGAGC
76  TTTCAGCACA      240
E--> 78  CTAATCCTG GAGAA ATG GCT TTT GTG CAT ATC AGA TGC TTG TGT TTC ATT
W--> 79  291
80                      Met Ala Phe Val His Ile Arg Cys Leu Cys Phe Ile
81                      1           5           10
E--> 83  CTT CTT TGT ACA ATA ACT GGC TAT TCT TTG GAG ATA AAA GTT AAT CCT
W--> 84  339
85  Leu Leu Cys Thr Ile Thr Gly Tyr Ser Leu Glu Ile Lys Val Asn Pro
W--> 86      15           20           25
E--> 88  CCT CAG GAT TTT GAA ATA TTG GAT CCT GGA TTA CTT GGT TAT CTC TAT
W--> 89  387
90  Pro Gln Asp Phe Glu Ile Leu Asp Pro Gly Leu Leu Gly Tyr Leu Tyr
W--> 91      30           35           40
E--> 93  TTG CAA TGG AAA CCT CCT GTG GTT ATA GAA AAA TTT AAG GGC TGT ACA
W--> 94  435
95  Leu Gln Trp Lys Pro Pro Val Val Ile Glu Lys Phe Lys Gly Cys Thr
W--> 96      45           50           55           60
E--> 98  CTA GAA TAT GAG TTA AAA TAC CGA AAT GTT GAT AGC GAC AGC TGG AAG
W--> 99  483
100  Leu Glu Tyr Glu Leu Lys Tyr Arg Asn Val Asp Ser Asp Ser Trp Lys
W--> 101      65           70           75
E--> 103  ACT ATA ATT ACT AGG AAT CTA ATT TAC AAG GAT GGG TTT GAT CTT AAT
W--> 104  531
105  Thr Ile Ile Thr Arg Asn Leu Ile Tyr Lys Asp Gly Phe Asp Leu Asn
W--> 106      80           85           90
E--> 108  AAA GGC ATT GAA GGA AAG ATA CGT ACG CAT TTG TCA GAG CAT TGT ACA
W--> 109  579
110  Lys Gly Ile Glu Gly Lys Ile Arg Thr His Leu Ser Glu His Cys Thr
W--> 111      95           100           105
E--> 113  AAT GGA TCA GAA GTA CAA AGT CCA TGG ATA GAA GCT TCT TAT GGG ATA
W--> 114  627
115  Asn Gly Ser Glu Val Gln Ser Pro Trp Ile Glu Ala Ser Tyr Gly Ile
W--> 116      110           115           120
E--> 118  TCA GAT GAA GGA AGT TTG GAA ACT AAA ATT CAG GAC ATG AAG TGT ATA
W--> 119  675
120  Ser Asp Glu Gly Ser Leu Glu Thr Lys Ile Gln Asp Met Lys Cys Ile

```

## RAW SEQUENCE LISTING

DATE: 04/08/2002

PATENT APPLICATION: US/09/714,792

TIME: 09:15:57

Input Set : N:\jumbos\09714792.raw.txt

Output Set: N:\CRF3\04082002\I714792.raw

```

W--> 121      125              130              135              140
E--> 123      TAT TAT AAC TGG CAG TAT TTG GTC TGC TCT TGG AAA CCT GGC AAG ACA
W--> 124 723
      125      Tyr Tyr Asn Trp Gln Tyr Leu Val Cys Ser Trp Lys Pro Gly Lys Thr
W--> 126              145              150              155
E--> 128      GTA TAT TCT GAT ACC AAC TAT ACC ATG TTT TTC TGG TAT GAG GGC TTG
W--> 129 771
      130      Val Tyr Ser Asp Thr Asn Tyr Thr Met Phe Phe Trp Tyr Glu Gly Leu
W--> 131              160              165              170
E--> 133      GAT CAT GCC TTA CAG TGT GCT GAT TAC CTC CAG CAT GAT GAA AAA AAT
W--> 134 819
      135      Asp His Ala Leu Gln Cys Ala Asp Tyr Leu Gln His Asp Glu Lys Asn
W--> 136              175              180              185
E--> 138      GTT GGA TGC AAA CTG TCC AAC TTG GAC TCA TCA GAC TAT AAA GAT TTT
W--> 139 867
      140      Val Gly Cys Lys Leu Ser Asn Leu Asp Ser Ser Asp Tyr Lys Asp Phe
W--> 141              190              195              200
E--> 143      TTT ATC TGT GTT AAT GGA TCT TCA AAG TTG GAA CCC ATC AGA TCC AGC
W--> 144 915
      145      Phe Ile Cys Val Asn Gly Ser Ser Lys Leu Glu Pro Ile Arg Ser Ser
W--> 146      205              210              215              220
E--> 148      TAT ACA GTT TTT CAA CTT CAA AAT ATA GTT AAA CCA TTG CCA CCA GAA
W--> 149 963
      150      Tyr Thr Val Phe Gln Leu Gln Asn Ile Val Lys Pro Leu Pro Pro Glu
W--> 151              225              230              235
E--> 153      TTC CTT CAT ATT AGT GTG GAG AAT TCC ATT GAT ATT AGA ATG AAA TGG
W--> 154 1011
      155      Phe Leu His Ile Ser Val Glu Asn Ser Ile Asp Ile Arg Met Lys Trp
W--> 156              240              245              250
E--> 158      AGC ACA CCT GGA GGA CCC ATT CCA CCA AGG TGT TAC ACT TAT GAA ATT
W--> 159 1059
      160      Ser Thr Pro Gly Gly Pro Ile Pro Pro Arg Cys Tyr Thr Tyr Glu Ile
W--> 161              255              260              265
E--> 163      GTG ATC CGA GAA GAC GAT ATT TCC TGG GAG TCT GCC ACA GAC AAA AAC
W--> 164 1107
      165      Val Ile Arg Glu Asp Asp Ile Ser Trp Glu Ser Ala Thr Asp Lys Asn
W--> 166              270              275              280
E--> 168      GAT ATG AAG TTG AAG AGG AGA GCA AAT GAA AGT GAA GAC CTA TGC TTT
W--> 169 1155
      170      Asp Met Lys Leu Lys Arg Arg Ala Asn Glu Ser Glu Asp Leu Cys Phe
W--> 171      285              290              295              300
E--> 173      TTT GTA AGA TGT AAG GTC AAT ATA TAT TGT GCA GAT GAT GGA ATT TGG
W--> 174 1203
      175      Phe Val Arg Cys Lys Val Asn Ile Tyr Cys Ala Asp Asp Gly Ile Trp
W--> 176              305              310              315
E--> 178      AGC GAA TGG AGT GAA GAG GAA TGT TGG GAA GGT TAC ACA GGG CCA GAC
W--> 179 1251
      180      Ser Glu Trp Ser Glu Glu Glu Cys Trp Glu Gly Tyr Thr Gly Pro Asp
W--> 181              320              325              330

```

*format  
even*

## RAW SEQUENCE LISTING

DATE: 04/08/2002

PATENT APPLICATION: US/09/714,792

TIME: 09:15:57

Input Set : N:\jumbos\09714792.raw.txt

Output Set: N:\CRF3\04082002\I714792.raw

```

183   TCA AAG ATT ATT TTC ATA GTA CCA GTT TGT CTT TTC TTT ATA TTC CTT      1299
184   Ser Lys Ile Ile Phe Ile Val Pro Val Cys Leu Phe Phe Ile Phe Leu
W--> 185           335           340           345
E--> 187   TTG TTA CTT CTT TGC CTT ATT GTG GAG AAG GAA GAA CCT GAA CCC ACA
W--> 188 1347
189   Leu Leu Leu Leu Cys Leu Ile Val Glu Lys Glu Glu Pro Glu Pro Thr
W--> 190           350           355           360
E--> 192   TTG AGC CTC CAT GTG GAT CTG AAC AAA GAA GTG TGT GCT TAT GAA GAT
W--> 193 1395
194   Leu Ser Leu His Val Asp Leu Asn Lys Glu Val Cys Ala Tyr Glu Asp
W--> 195           365           370           375           380
E--> 197   ACC CTC TGT TAAACCACCA ATTTCTTGAC ATAGAGCCAG CCAGCAGGAG
W--> 198 1444
199   Thr Leu Cys
E--> 202   TCATATTAAA CTCAATTCT CTTAAATTT CGAATACATC TTCTTGAAAA
203 TCCAAAAAAA 1504
205   AAAAAAAAAA AAAAACTCGA G
291 (2) INFORMATION FOR SEQ ID NO: 3:
293   (i) SEQUENCE CHARACTERISTICS:
294       (A) LENGTH: 1369 base pairs
295       (B) TYPE: nucleic acid
296       (C) STRANDEDNESS: double
297       (D) TOPOLOGY: linear
299   (ii) MOLECULE TYPE: cDNA
301   (iii) HYPOTHETICAL: NO
304   (ix) FEATURE:
305       (A) NAME/KEY: CDS
306       (B) LOCATION: 103..1245
309   (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 3:
E--> 311   GGATCCGCGC GGATGAAGGC TATTTGAAGT CGCCATAACC TGGTCAGAAG
312 TGTGCCTGTC 60
E--> 314   GCGGGGGAGA GAGGCAATAT CAAGGTTTTA AATCTCGGAG AA ATG GCT TTC
315 GTT 114
316
317   Met Ala Phe Val
318   1
E--> 319   TGC TTG GCT ATC GGA TGC TTA TAT ACC TTT CTG ATA AGC ACA ACA TTT
W--> 320 162
321   Cys Leu Ala Ile Gly Cys Leu Tyr Thr Phe Leu Ile Ser Thr Thr Phe
W--> 322   5 10 15 20
E--> 324   GGC TGT ACT TCA TCT TCA GAC ACC GAG ATA AAA GTT AAC CCT CCT CAG
W--> 325 210
326   Gly Cys Thr Ser Ser Ser Asp Thr Glu Ile Lys Val Asn Pro Pro Gln
W--> 327           25           30           35
E--> 329   GAT TTT GAG ATA GTG GAT CCC GGA TAC TTA GGT TAT CTC TAT TTG CAA
W--> 330 258
331   Asp Phe Glu Ile Val Asp Pro Gly Tyr Leu Gly Tyr Leu Tyr Leu Gln
W--> 332           40           45           50
E--> 334   TGG CAA CCC CCA CTG TCT CTG GAT CAT TTT AAG GAA TGC ACA GTG GAA
W--> 335 306

```

*same*

1525

*same*

## RAW SEQUENCE LISTING

DATE: 04/08/2002

PATENT APPLICATION: US/09/714,792

TIME: 09:15:57

Input Set : N:\jumbos\09714792.raw.txt

Output Set: N:\CRF3\04082002\I714792.raw

```

      336   Trp Gln Pro Pro Leu Ser Leu Asp His Phe Lys Glu Cys Thr Val Glu
W--> 337           55              60              65
E--> 339   TAT GAA CTA AAA TAC CGA AAC ATT GGT AGT GAA ACA TGG AAG ACC ATC
W--> 340 354
      341   Tyr Glu Leu Lys Tyr Arg Asn Ile Gly Ser Glu Thr Trp Lys Thr Ile
W--> 342           70              75              80
E--> 344   ATT ACT AAG AAT CTA CAT TAC AAA GAT GGG TTT GAT CTT AAC AAG GGC
W--> 345 402
      346   Ile Thr Lys Asn Leu His Tyr Lys Asp Gly Phe Asp Leu Asn Lys Gly
W--> 347           85              90              95              100
E--> 349   ATT GAA GCG AAG ATA CAC ACG CTT TTA CCA TGG CAA TGC ACA AAT GGA
W--> 350 450
      351   Ile Glu Ala Lys Ile His Thr Leu Leu Pro Trp Gln Cys Thr Asn Gly
W--> 352           105              110              115
E--> 354   TCA GAA GTT CAA AGT TCC TGG GCA GAA ACT ACT TAT TGG ATA TCA CCA
W--> 355 498
      356   Ser Glu Val Gln Ser Ser Trp Ala Glu Thr Thr Tyr Trp Ile Ser Pro
W--> 357           120              125              130
E--> 359   CAA GGA ATT CCA GAA ACT AAA GTT CAG GAT ATG GAT TGC GTA TAT TAC
W--> 360 546
      361   Gln Gly Ile Pro Glu Thr Lys Val Gln Asp Met Asp Cys Val Tyr Tyr
W--> 362           135              140              145
E--> 364   AAT TGG CAA TAT TTA CTC TGT TCT TGG AAA CCT GGC ATA GGT GTA CTT
W--> 365 594
      366   Asn Trp Gln Tyr Leu Leu Cys Ser Trp Lys Pro Gly Ile Gly Val Leu
W--> 367           150              155              160
E--> 369   CTT GAT ACC AAT TAC AAC TTG TTT TAC TGG TAT GAG GGC TTG GAT CAT
W--> 370 642
      371   Leu Asp Thr Asn Tyr Asn Leu Phe Tyr Trp Tyr Glu Gly Leu Asp His
W--> 372           165              170              175              180
E--> 374   GCA TTA CAG TGT GTT GAT TAC ATC AAG GCT GAT GGA CAA AAT ATA GGA
W--> 375 690
      376   Ala Leu Gln Cys Val Asp Tyr Ile Lys Ala Asp Gly Gln Asn Ile Gly
W--> 377           185              190              195
E--> 379   TGC AGA TTT CCC TAT TTG GAG GCA TCA GAC TAT AAA GAT TTC TAT ATT
W--> 380 738
      381   Cys Arg Phe Pro Tyr Leu Glu Ala Ser Asp Tyr Lys Asp Phe Tyr Ile
W--> 382           200              205              210
E--> 384   TGT GTT AAT GGA TCA TCA GAG AAC AAG CCT ATC AGA TCC AGT TAT TTC
W--> 385 786
      386   Cys Val Asn Gly Ser Ser Glu Asn Lys Pro Ile Arg Ser Ser Tyr Phe
W--> 387           215              220              225
E--> 389   ACT TTT CAG CTT CAA AAT ATA GTT AAA CCT TTG CCG CCA GTC TAT CTT
W--> 390 834
      391   Thr Phe Gln Leu Gln Asn Ile Val Lys Pro Leu Pro Pro Val Tyr Leu
W--> 392           230              235              240
E--> 394   ACT TTT ACT CGG GAG AGT TCA TGT GAA ATT AAG CTG AAA TGG AGC ATA
W--> 395 882
      396   Thr Phe Thr Arg Glu Ser Ser Cys Glu Ile Lys Leu Lys Trp Ser Ile

```

*same*

## RAW SEQUENCE LISTING

DATE: 04/08/2002

PATENT APPLICATION: US/09/714,792

TIME: 09:15:57

Input Set : N:\jumbos\09714792.raw.txt

Output Set: N:\CRF3\04082002\I714792.raw

```

W--> 397      245                      250                      255                      260
E--> 399      CCT TTG GGA CCT ATT CCA GCA AGG TGT TTT GAT TAT GAA ATT GAG ATC
W--> 400 930
      401      Pro Leu Gly Pro Ile Pro Ala Arg Cys Phe Asp Tyr Glu Ile Glu Ile
W--> 402                      265                      270                      275
E--> 404      AGA GAA GAT GAT ACT ACC TTG GTG ACT GCT ACA GTT GAA AAT GAA ACA
W--> 405 978
      406      Arg Glu Asp Asp Thr Thr Leu Val Thr Ala Thr Val Glu Asn Glu Thr
W--> 407                      280                      285                      290
E--> 409      TAC ACC TTG AAA ACA ACA AAT GAA ACC CGA CAA TTA TGC TTT GTA GTA
W--> 410 1026
      411      Tyr Thr Leu Lys Thr Thr Asn Glu Thr Arg Gln Leu Cys Phe Val Val
W--> 412                      295                      300                      305
E--> 414      AGA AGC AAA GTG AAT ATT TAT TGC TCA GAT GAC GGA ATT TGG AGT GAG
W--> 415 1074
      416      Arg Ser Lys Val Asn Ile Tyr Cys Ser Asp Asp Gly Ile Trp Ser Glu
W--> 417                      310                      315                      320
E--> 419      TGG AGT GAT AAA CAA TGC TGG GAA GGT GAA GAC CTA TCG AAG AAA ACT
W--> 420 1122
      421      Trp Ser Asp Lys Gln Cys Trp Glu Gly Glu Asp Leu Ser Lys Lys Thr
W--> 422      325                      330                      335                      340
E--> 424      TTG CTA CGT TTC TGG CTA CCA TTT GGT TTC ATC TTA ATA TTA GTT ATA
W--> 425 1170
      426      Leu Leu Arg Phe Trp Leu Pro Phe Gly Phe Ile Leu Ile Leu Val Ile
W--> 427                      345                      350                      355
E--> 429      TTT GTA ACC GGT CTG CTT TTG CGT AAG CCA AAC ACC TAC CCA AAA ATG
W--> 430 1218
      431      Phe Val Thr Gly Leu Leu Leu Arg Lys Pro Asn Thr Tyr Pro Lys Met
W--> 432                      360                      365                      370
E--> 434      ATT CCA GAA TTT TTC TGT GAT ACA TGA AGACTTTCCA TATCAAGAGA
W--> 435 1265
      436      Ile Pro Glu Phe Phe Cys Asp Thr *
W--> 437                      375                      380
E--> 439      CATGGTATTG ACTCAACAGT TTCCAGTCAT GGCCAAATGT TCAATATGAG
      440 TCTCAATAAAA 1325
      442      CTGAATTTTT CTTGCGAAAA AAAAAAAAAA AAATCCGCGG ATCC
      445 (2) INFORMATION FOR SEQ ID NO: 4:
      447      (i) SEQUENCE CHARACTERISTICS:
      448          (A) LENGTH: 380 amino acids
      449          (B) TYPE: amino acid
      450          (D) TOPOLOGY: linear
      452      (ii) MOLECULE TYPE: protein
      454      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 4:
      456      Met Ala Phe Val Cys Leu Ala Ile Gly Cys Leu Tyr Thr Phe Leu Ile
      457          1              5              10              15
      459      Ser Thr Thr Phe Gly Cys Thr Ser Ser Ser Asp Thr Glu Ile Lys Val
      460          20              25              30
      462      Asn Pro Pro Gln Asp Phe Glu Ile Val Asp Pro Gly Tyr Leu Gly Tyr
      463          35              40              45

```

1369

## RAW SEQUENCE LISTING

DATE: 04/08/2002

PATENT APPLICATION: US/09/714,792

TIME: 09:15:57

Input Set : N:\jumbos\09714792.raw.txt

Output Set: N:\CRF3\04082002\I714792.raw

```

465  Leu Tyr Leu Gln Trp Gln Pro Pro Leu Ser Leu Asp His Phe Lys Glu
466      50                      55                      60
468  Cys Thr Val Glu Tyr Glu Leu Lys Tyr Arg Asn Ile Gly Ser Glu Thr
469      65                      70                      75                      80
471  Trp Lys Thr Ile Ile Thr Lys Asn Leu His Tyr Lys Asp Gly Phe Asp
472      85                      90                      95
474  Leu Asn Lys Gly Ile Glu Ala Lys Ile His Thr Leu Leu Pro Trp Gln
475      100                     105                     110
477  Cys Thr Asn Gly Ser Glu Val Gln Ser Ser Trp Ala Glu Thr Thr Tyr
478      115                     120                     125
480  Trp Ile Ser Pro Gln Gly Ile Pro Glu Thr Lys Val Gln Asp Met Asp
481      130                     135                     140
483  Cys Val Tyr Tyr Asn Trp Gln Tyr Leu Leu Cys Ser Trp Lys Pro Gly
484      145                     150                     155                     160
486  Ile Gly Val Leu Leu Asp Thr Asn Tyr Asn Leu Phe Tyr Trp Tyr Glu
487      165                     170                     175
489  Gly Leu Asp His Ala Leu Gln Cys Val Asp Tyr Ile Lys Ala Asp Gly
490      180                     185                     190
492  Gln Asn Ile Gly Cys Arg Phe Pro Tyr Leu Glu Ala Ser Asp Tyr Lys
493      195                     200                     205
495  Asp Phe Tyr Ile Cys Val Asn Gly Ser Ser Glu Asn Lys Pro Ile Arg
496      210                     215                     220
498  Ser Ser Tyr Phe Thr Phe Gln Leu Gln Asn Ile Val Lys Pro Leu Pro
499      225                     230                     235                     240
501  Pro Val Tyr Leu Thr Phe Thr Arg Glu Ser Ser Cys Glu Ile Lys Leu
502      245                     250                     255
504  Lys Trp Ser Ile Pro Leu Gly Pro Ile Pro Ala Arg Cys Phe Asp Tyr
505      260                     265                     270
507  Glu Ile Glu Ile Arg Glu Asp Asp Thr Thr Leu Val Thr Ala Thr Val
508      275                     280                     285
510  Glu Asn Glu Thr Tyr Thr Leu Lys Thr Thr Asn Glu Thr Arg Gln Leu
511      290                     295                     300
513  Cys Phe Val Val Arg Ser Lys Val Asn Ile Tyr Cys Ser Asp Asp Gly
514      305                     310                     315                     320
516  Ile Trp Ser Glu Trp Ser Asp Lys Gln Cys Trp Glu Gly Glu Asp Leu
517      325                     330                     335
519  Ser Lys Lys Thr Leu Leu Arg Phe Trp Leu Pro Phe Gly Phe Ile Leu
520      340                     345                     350
522  Ile Leu Val Ile Phe Val Thr Gly Leu Leu Leu Arg Lys Pro Asn Thr
523      355                     360                     365
E--> 525  Tyr Pro Lys Met Ile Pro Glu Phe Phe Cys Asp Thr *
E--> 526      370                     375                     380

```

## VERIFICATION SUMMARY

DATE: 04/08/2002

PATENT APPLICATION: US/09/714,792

TIME: 09:15:58

Input Set : N:\jumbos\09714792.raw.txt

Output Set: N:\CRF3\04082002\I714792.raw

L:32 M:220 C: Keyword misspelled or invalid format, [(A) APPLICATION NUMBER:]  
L:33 M:220 C: Keyword misspelled or invalid format, [(B) FILING DATE:]  
L:66 M:254 E: No. of Bases conflict, Input:0 Counted:50 SEQ:1  
M:254 Repeated in SeqNo=1  
L:79 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:84 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:86 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:89 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:91 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:94 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:96 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:99 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:101 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:104 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:106 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:109 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:111 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:114 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:116 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:119 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:121 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:124 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:126 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:129 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:131 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:134 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:136 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:139 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:141 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:144 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:146 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:149 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:151 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:154 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:156 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:159 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:161 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:164 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:166 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:169 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:171 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:174 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:176 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:179 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:181 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:185 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:188 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:190 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1



## VERIFICATION SUMMARY

DATE: 04/08/2002

PATENT APPLICATION: US/09/714,792

TIME: 09:15:58

Input Set : N:\jumbos\09714792.raw.txt

Output Set: N:\CRF3\04082002\I714792.raw

L:193 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:195 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:198 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1  
L:311 M:254 E: No. of Bases conflict, Input:0 Counted:50 SEQ:3  
M:254 Repeated in SeqNo=3  
L:320 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3  
L:322 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3  
L:325 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3  
L:525 M:342 E: Invalid Stop Code On Error, STOP CODON:\*  
L:526 M:203 E: No. of Seq. differs, LENGTH:Input:380 Found:381 SEQ:4  
L:536 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=5  
L:551 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=6  
L:566 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=7  
L:581 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=8  
L:596 M:246 W: Invalid value of Alpha Sequence Header Field, [MOLECULE TYPE:], SeqNo=9

**STATISTICS SUMMARY**

PATENT APPLICATION: US/09/714,792

DATE: 04/08/2002

TIME: 09:15:58

Input Set : N:\jumbos\09714792.raw.txt

Output Set: N:\CRF3\04082002\I714792.raw

Application Serial Number: US/09/714,792

Alpha or Numeric: Alpha

Application Class:

Application File Date: 11-16-2000

Art Unit: 1646

Software Application: PatentIN1.0

Total Number of Sequences: 9

Total Nucleotides: 2994

Total Amino Acids: 764

Number of Errors: 58

Number of Warnings: 100

Number of Corrections: 0

**MESSAGE SUMMARY**

203 E: 1 (No. of Seq. differs)

246 W: 5 (Invalid value of Alpha Sequence Header Field)

254 E: 56 (No. of Bases conflict)

342 E: 1 (Invalid Stop Code On Error)

336 W: 95 (Invalid Amino Acid Number in Coding Region)